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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/576,850	02/26/2007	Jae-Yeol Park	7120P001	2288
	7590 07/16/2010 off, Taylor & Zafman	EXAMINER		
12400 Wilshire Boulevard 7th Floor Los Angeles, CA 90025			SHEEHAN, JOHN P	
			ART UNIT	PAPER NUMBER
			1793	
			MAIL DATE	DELIVERY MODE
			07/16/2010	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

		Application No.	Applicant(s)				
Office Action Summary		10/576,850	PARK ET AL.				
		Examiner	Art Unit				
		John P. Sheehan	1793				
	The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).							
Status							
1)[\	Responsive to communication(s) filed on <u>22 A</u>	nril 2010					
·		action is non-final.					
′=	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
٥/١	closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.						
	closed in accordance with the practice under 2	A parto Quayro, 1000 0.B. 11, 1	00 0.0. 210.				
Dispositi	on of Claims						
4)🛛	☑ Claim(s) <u>1-4</u> is/are pending in the application.						
	4a) Of the above claim(s) <u>4</u> is/are withdrawn from consideration.						
5)	5) Claim(s) is/are allowed.						
6)🖂	6) Claim(s) <u>1-3</u> is/are rejected.						
7)	Claim(s) is/are objected to.						
·	Claim(s) are subject to restriction and/or	r election requirement.					
Applicati	on Papers						
9) The specification is objected to by the Examiner.							
10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.							
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).							
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.							
Priority u	ınder 35 U.S.C. § 119						
<ul> <li>12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).</li> <li>a) All b) Some * c) None of:</li> <li>1. Certified copies of the priority documents have been received.</li> <li>2. Certified copies of the priority documents have been received in Application No</li> <li>3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>							
2)  Notic 3) Inforr	e of References Cited (PTO-892) e of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO/SB/08) r No(s)/Mail Date	4)  Interview Summary Paper No(s)/Mail D 5)  Notice of Informal I 6)  Other:	ate				

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#### **DETAILED ACTION**

### Claim Rejections - 35 USC § 112, 1st Paragraph

1. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

- 2. Claims 1 to 3 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.
  - I. The claims recite that the sendust, High Flux powder, MPP powder and silicon steel powder are "produced by a spray process". However, there is no support in the application, as filed, for the sendust powder to be made by a "spray process".
  - II. In claim 1, line 6, the limitation, "compacted by an insulation coating" does not find support in the application as filed.
  - III. In claim 3, line 6 and 7, the limitation, "compacted by an insulation coating and/or at a pressure" does not find support in the application as filed.

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# Claim Rejections - 35 USC § 112, 2<sup>nd</sup> Paragraph

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

- 4. Claims 1 to 3 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
  - I. In claim 1, line 6, the meaning of the limitation, "compacted by an insulation coating" is not clear. For example, how does an insulation coating cause compaction?
  - II. In claim 3, line 6 and 7, the meaning of the limitation, "compacted by an insulation coating and/or at a pressure" is not clear. For example, how does an insulation coating cause compaction?

### Response to Arguments

5. Applicant's arguments and the amendments to the claims, filed April 22, 2010, with respect to the rejection(s) of claim(s) 1 to 3 under 35 U.S.C. 103 have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made.

## Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

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7. Claims 1 and 2 are rejected under 35 U.S.C. 103(a) as being unpatentable over Moro et al. (Moro '841, US Patent No. 5,651,841, cited by the Examiner).

Moro '841 teaches a specific example that employs Sendust having a composition that is encompassed by the Sendust composition recited applicants' claim 2 that is made by atomization, a spray process, as recited in claim 1 (column 10, lines 37 to 41). In this same example Moro '841 also employs a MPP alloy powder having a composition that is encompassed by the MPP composition recited in applicants' claim 2 that is made by atomization, a spray process, as recited in applicants' claims 1 (column 10, lines 54 to 56). The particle size of each of these powders is encompassed by the powder size recited in each of applicants' claims (column 10, lines 39 and 56). Moro '841 teaches that each of these powders is mixed with a resin, a titanate and a lubricant which are encompassed by the insulation coating recited in applicant' claims (column 10, line 53 to column 11, line 4). The coated powders are compacted at a pressure of 10 tons/cm<sup>2</sup> and the compacted powders are then heat treated at 700°C (column 11, lines 7 to 9). This compaction pressure and heat treatment temperature are encompassed by the compaction pressure and heat treatment temperature recited in each of applicants' claims. Thus, Moro '841 teaches a soft magnetic product that, with the exception of the unit block dimensions, is encompassed by the instant claims and which is made by a process that is encompassed by the process recited in applicants' claims.

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The claims and Moro '841 differ in that Moro '841 does not teach the unit block dimensions recited in applicants' claims.

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However one of ordinary skill in the art at the time the invention was made would have considered the invention to have been obvious because the dimensions recited in the instant claims would have been obvious to one of ordinary skill in the art at the time the invention was made because the dimensions of the core are considered to be merely a matter of size of the core. The size of a product does not lend patentability to the claimed product, MPEP 2144.04 (IV)(A).

# IV. CHANGES IN SIZE, SHAPE, OR SEQUENCE OF ADDING INGREDIENTS

A. Changes in Size/Proportion

In re Rose, 220 F.2d 459, 105 USPQ 237 (CCPA 1955) (Claims directed to a lumber package "of appreciable size and weight requiring handling by a lift truck" where held unpatentable over prior art lumber packages which could be lifted by hand because limitations relating to the size of the package were not sufficient to patentably distinguish over the prior art.); In re Rinehart, 531 F.2d 1048, 189 USPQ 143 (CCPA 1976) ("mere scaling up of a prior art process capable of being scaled up, if such were the case, would not establish patentability in a claim to an old process so scaled." 531 F.2d at 1053, 189 USPQ at 148.). In Gardner v. TEC Systems, Inc., 725 F.2d 1338, 220 USPQ 777 (Fed. Cir. 1984), cert. denied, 469 U.S. 830, 225 USPQ 232 (1984), the Federal Circuit held that, where the only difference between the prior art and the claims was a recitation of relative dimensions of the claimed device and a device having the claimed relative dimensions would not perform differently than the prior art device, the claimed device was not patentably distinct from the prior art device.

8. Claims 1 and 2 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bae (Bae '399, US Patent No. 5,470,399, cited by the Examiner).

Bae '399 teaches a MPP powder having a composition that overlaps the MPP composition recited in applicants' claims that is made by spouting a fluid into the flow of the NI-Fe-Mo melt, a spray process, as recited in the applicants' claims (column 3, lines 22 to 26). The MPP powder is then coated with a ceramic which is encompassed by the insulation coating recited in applicant' claims, molding the coated particles and annealing the compacted particles (column 3, lines 27 to 35). Bae '399 teaches a powder particle size that is encompassed by the powder particle size recited in the instant claims (column 5, lines 31 to 45). Bae '399 teaches that the coated powder is compacted at a pressure of 240,000 psi (18.6 tons/cm²) (column 7, line 38) and then heat treated at 670°C which is encompassed by the heat treatment temperature recited in applicants' claims. Thus, Bae '399 teaches a soft magnetic product that, with the exception of the unit block dimensions, is encompassed by the instant claims and which is made by a process that is very similar to the process recited in applicants' claims.

The claims and Bae '399 differ in that Bae '399 does not teach the unit block dimensions recited in applicants' claims nor the exact compaction pressure as recited in the instant claims. Bae '399 teaches a pressure of 18.6 tons/cm² while the applicants' product by process claims recite an upper pressure limit of 18 tonss/cm².

However one of ordinary skill in the art at the time the invention was made would have considered the invention to have been obvious because the dimensions recited in the instant claims would have been obvious to one of ordinary skill in the art at the time the invention was made because the dimensions of the core are considered to be

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merely a matter of size of the core. The size of a product does not lend patentability to the claimed product, MPEP 2144.04 (IV)(A).

# IV. CHANGES IN SIZE, SHAPE, OR SEQUENCE OF ADDING INGREDIENTS

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In re Rose, 220 F.2d 459, 105 USPQ 237 (CCPA 1955) (Claims directed to a lumber package "of appreciable size and weight requiring handling by a lift truck" where held unpatentable over prior art lumber packages which could be lifted by hand because limitations relating to the size of the package were not sufficient to patentably distinguish over the prior art.); In re Rinehart, 531 F.2d 1048, 189 USPQ 143 (CCPA 1976) ("mere scaling up of a prior art process capable of being scaled up, if such were the case, would not establish patentability in a claim to an old process so scaled." 531 F.2d at 1053, 189 USPQ at 148.). In Gardner v. TEC Systems, Inc., 725 F.2d 1338, 220 USPQ 777 (Fed. Cir. 1984), cert. denied, 469 U.S. 830, 225 USPQ 232 (1984), the Federal Circuit held that, where the only difference between the prior art and the claims was a recitation of relative dimensions of the claimed device and a device having the claimed relative dimensions would not perform differently than the prior art device, the claimed device was not patentably distinct from the prior art device.

With respect to the compaction pressure, the Examiner notes that the claims are directed to a product and not a process. Even though product-by-process claims are limited by and defined by the process, determination of patentability is based on the product itself. The patentability of a product does not depend on its method of production. If the product in the product-by process claim is the same as or obvious from a product of the prior art, the claim is unpatentable even though the prior product was made by a different process. MPEP 2113. Further, the difference between applicants' claimed upper compaction pressure of 18 tons/cm² and the compaction pressure of 18.6 tons/cm² taught by Bae '399 are so close one of ordinary skill in the art

would have expected the resulting compacted powder products to have the same properties.

9. Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over each of Moro et al. (Moro '841, US Patent No. 5,651,841, cited by the Examiner) and Bae (Bae '399, US Patent No. 5,470,399, cited by the Examiner).as applied to claims 1 and 2 above, and further in view of Japanese Patent Document No. 4-165607 (Japan '607, cited in the IDS submitted October 9, 2009).

Moro '841 and Bae '399 teach and are applied as set forth above.

Japan '607 teaches that it is known in the core art to combine individual cores using epoxy to form a larger core.

Claim 3 and each of Moro '841 and Bae '399 differ in that the Moro '841 and Bae '399 are silent with respect to combining the individual cores.

However one of ordinary skill in the art at the time the invention was made would have considered the invention to have been obvious because Japan '607 teaches that it is a well known practice in the art to join individual cores.

#### Conclusion

10. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within

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TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to John P. Sheehan whose telephone number is (571) 272-1249. The examiner can normally be reached on T-F (7:30-5:00) Second Monday Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Roy King can be reached on (571) 272-1244. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/John P. Sheehan/ Primary Examiner Art Unit 1793